

application. Distances to contours were determined utilizing the F(50-50) and F(50-10) FM curves as appropriate. Station facilities were based on data on file with the Commission while terrain information was determined using the NGDC 30 second database. The resultant distance to contours for each station are included herein.

TABLE 2  
DETAILED ALLOCATION STUDY

<u>CHANNEL</u>	<u>STATION</u>	<u>LOCATION</u>	<u>DISTANCE IN KM</u>	<u>ACTUAL</u>	<u>REQUIRED</u>
204	None sufficiently Close				
205A	NEW, Sellersville, Pa		21.51	12.71	
206	None sufficiently Close				
207A	WRDV Lic Warminster, Pa		48.94	47.94	
207A	WRDV App Warminster, Pa		48.94	30.24	
208	None sufficiently close				
209	None sufficiently close				
210	None sufficiently close				
260	WQQQ Lic Easton, Pa.		24.74	16.00	
261	None sufficiently close				

Clearances are based on the effective field of the proposed DA power of the NEW, ALLENTOWN, PA facility and the appropriate terrain factors.

Figure 5 shows the appropriate protected and interfering contours for the above stations. Detailed terrain 2-10 mile averaging over the pertinent arcs was employed. The power and height proposed by the applicant provides the required protection to all existing FM and TV Channel 6 stations as required by the Commission's Rules.

## 5. PROTECTION OF CHANNEL 6

Using the procedures of Section 73.208(c), The Distance to WPVI Philadelphia, Pa Channel 6 was calculated. The applicable distance is detailed in table three.

TABLE 3

<u>STATION</u>	<u>DISTANCE</u>	<u>AZIMUTH</u>
WPVI Philadelphia, Pa	60.28Km	163.6

In all cases, service contours studied were F(50,50) and all interfering contours were F(50,10). Station facilities were based on data on file with the Commission while terrain information was determined using the NGDC 30 second database.

The study revealed the signal strength of WPVI to be between 66 Dbu and 64 Dbu in the vicinity of the proposed site. The entire resultant interference area lies between these contours. Figure 1 of 73.599 imposes a series of protection ratios for a channel 207 operation as proposed herein.

The proposed FM site is located in Salisbury Township. The interference area as calculated pursuant to 73.525 includes portions of Salisbury, Upper and Lower Saucon Townships, all communities with populations less than 50,000 persons. This being the case the following formula for vertical polarity only was used: .120Kw (max DA)/40 = .003Kw, or 3 watts (max DA) of equiva-

lent horizontal power.

The interference to WPVI is that area created by the locus of the composite of the proposed FM contours, based on the equivalent horizontal power of 3 watts (max DA), and the associated TV Channel six contours as dictated in 73.599 figure 1. Due to the DA pattern proposed herein some of the distances to the FM contours extended less than 1.6 kilometers. In such cases the following Free Space formula was used to determine distance to contours:

$$\text{Where, } E = 106.92 - 20 \log(d) + \text{ERP}$$

E = free-space field (Dbu)

d = distance (km)

ERP = effective radiated power (Dbk)

In all cases where the formula resulted in distances greater than 1.6 Km such contours were determined to be 1.6 Km. It should also be noted that since only vertical polarization is proposed, no adjustment for TV antenna receive directivity was included in the determination of the interference area.

The resultant interference area is plotted, as figure 6, on the pertinent portion of the U.S. 1980 Census Tracts Map for the Allentown, Bethlehem, Easton Standard Metropolitan Statistical Area. Four Tracts are affected. Tract 67.01 has a population of 4,833 persons, .4% of this tract is included in the interference area for a total of 19 persons affected in the tract. Tract 67.02 has a population of 2,647 persons, 36% of this tract is included in the interference area for a total of 953 persons affected in the tract. Tract 69.03 has a population of 4,166 persons, 17% of

this tract is included in the interference area for a total of 708 persons affected in the tract. Tract 180.02 has a population of 4,201 persons, .7% of this tract is included in the interference area for a total of 29 persons affected in the tract.

The total number of persons included in the interference area is 1,709.

Areas were determined by use of polar planimeter.

## **6. ENVIRONMENTAL CONSIDERATIONS**

The proposed facilities will utilize the existing WFMZ-TV and WFMZ-FM tower and will not increase the overall height of the structure. The proposed operation is excluded under Section 1.1306 and does not come under Section 1.1307. The proposed facilities are not a hazard to humans, utilizing the procedures in OST bulletin 65.

## **7. BLANKETING AND INTERMODULATION INTERFERENCE**

The area surrounding the proposed site is rural, due to the relatively low power utilized, no blanketing interference is anticipated. However, the applicant will investigate and cure any complaints reported within the blanketing area.

Since WFMZ TV and FM will be colocated and there are also various land mobile stations in the immediate vicinity, the possibility exists that intermodulation products could result (including receiver induced intermod) or receivers could be

overloaded. Due to the low power of this proposal no such results are anticipated, however if such interference does result, the applicant will accept responsibility for eliminating same. If interference is encountered by any other licensee as a result of a grant of this application, the applicant will work to achieve an equitable solution to the problem.

#### **8. AREA AND POPULATION**

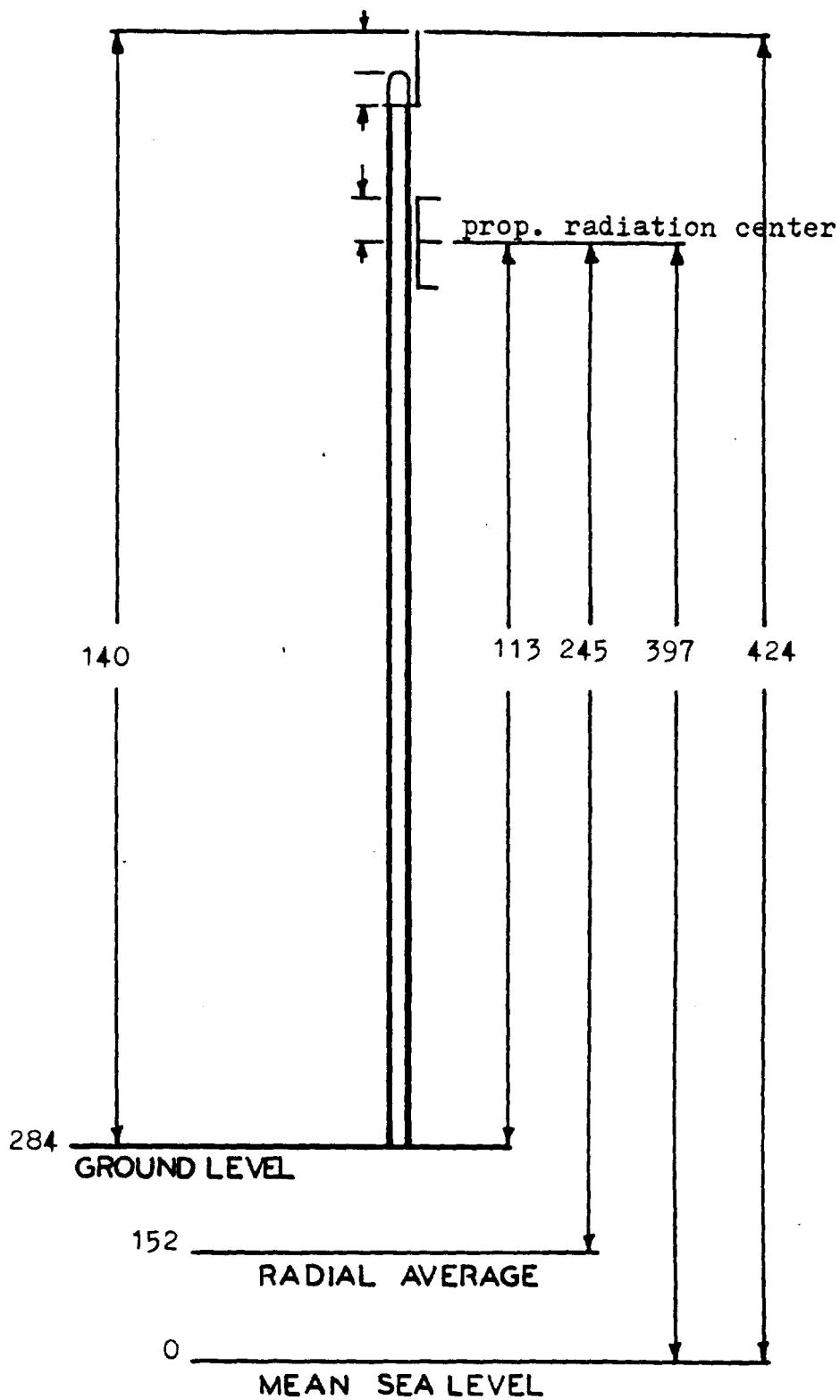
The population to be served by the proposed facilities was calculated using the 1980 United States Census assuming a uniform population distribution. Based on this study, the 60 dBu contour of the proposed facility covers a land area of 379 square KM and a population of 296,437 persons.

#### **9. FAA NOTIFICATION**

The FAA has not been notified of the proposed construction since the supporting structure is existing and this proposal does not increase the overall height.

#### **10. CONCLUSIONS**

Based on the information contained herein, the proposed facilities comply with all applicable FCC regulations and allocation policies with regard to existing FM and TV facilities.



All heights  
in meters

Tower is guyed  
existing WFMZ  
TV and FM Allentown

FIGURE ONE

ANTENNA VERTICAL PLAN SKETCH

TABLE ONE  
 HORIZONTAL RADIATION PATTERN  
 PROPOSED NEW NON-COMMERCIAL FM  
 ALLENTOWN, PENNSYLVANIA

BEARING	FIELD	PWR Kw	BEARING	FIELD	PWR Kw
000	.342	.014	180	.183	.004
010	.438	.023	190	.183	.004
020	.548	.036	200	.183	.004
030	.689	.057	210	.183	.004
040	.811	.079	220	.183	.004
050	.899	.097	230	.183	.004
060	.975	.114	240	.183	.004
070	1.000	.120	250	.183	.004
080	.975	.114	260	.183	.004
090	.899	.097	270	.183	.004
100	.811	.079	280	.183	.004
110	.689	.057	290	.183	.004
120	.548	.036	300	.183	.004
130	.438	.023	310	.183	.004
140	.342	.014	320	.183	.004
150	.274	.009	330	.183	.004
160	.224	.006	340	.224	.006
170	.183	.004	350	.274	.009

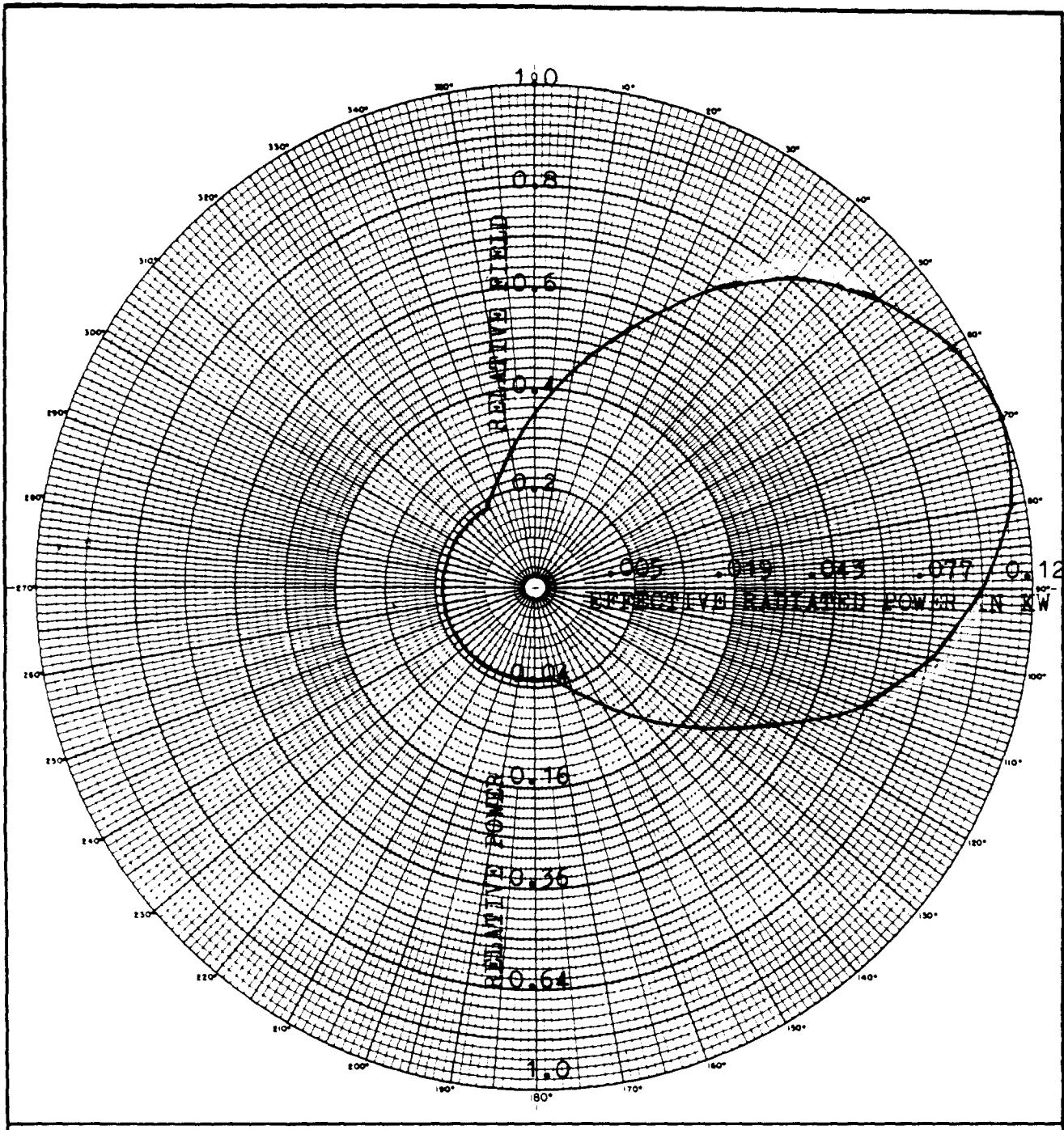


FIGURE TWO

PLOT OF DA PATTERN  
(HORIZONTAL RADIATION)  
PATTERN

The final pattern will be tuned so that the actual radiation at any azimuth will not exceed that which is shown. The rate of change will not exceed 2.0 Db/10° of azimuth change.

Applicant proposes Vertical Polarization only.

0.120 KW Max ERP

FIGURE THREE

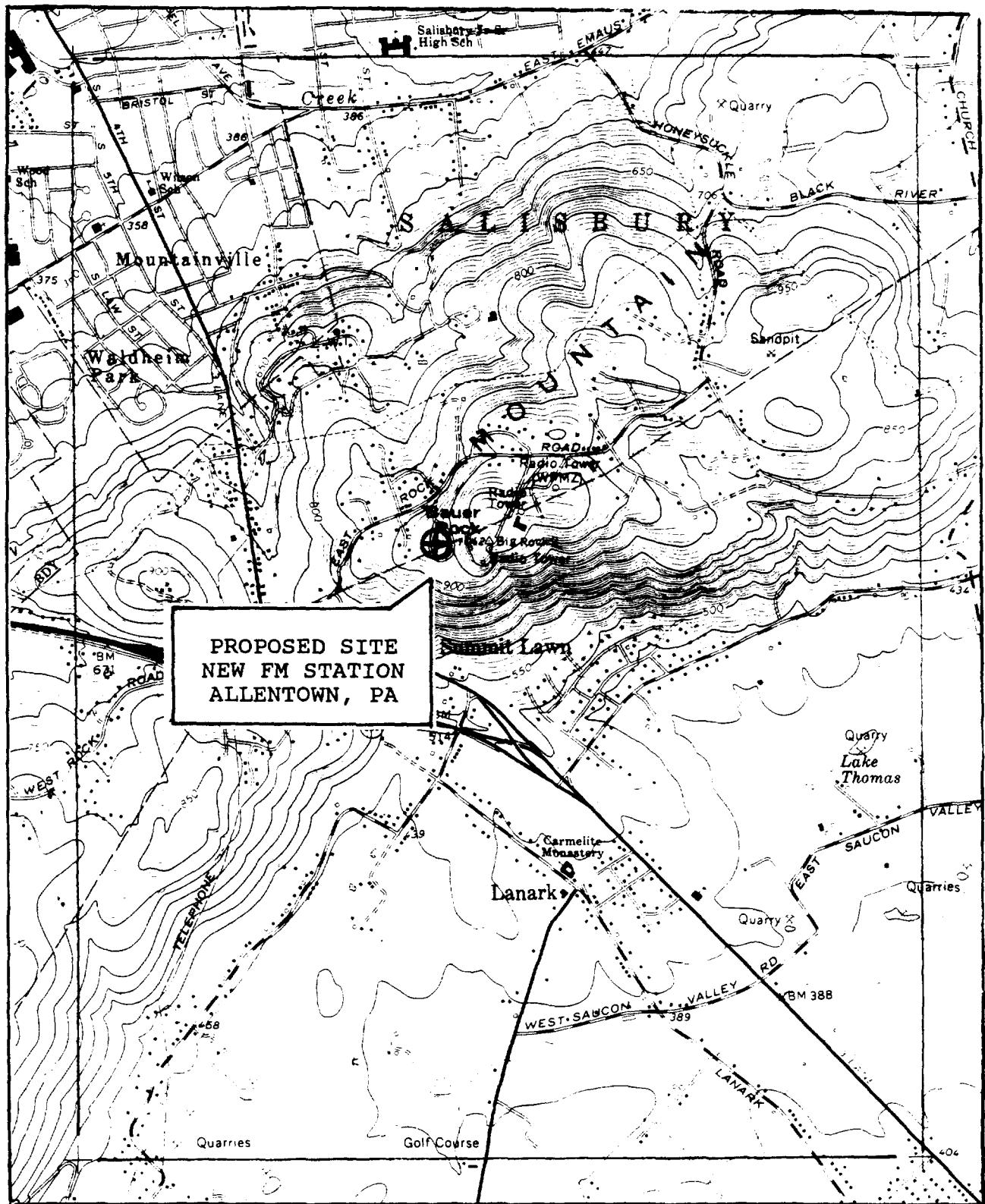
TOPOGRAPHIC MAP OF TRANSMITTER SITE

75° 27' 30"

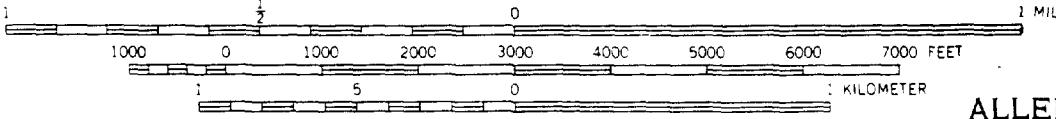
75° 25' 00"

40° 35' 00"

40° 35' 00"



SCALE 1:24000



CONTOUR INTERVAL 10 FEET  
NATIONAL GEODETIC VERTICAL DATUM OF 1929

-12-

ALLENTOWN EAST QUADRANGLE  
PENNSYLVANIA  
7.5 MINUTE SERIES (TOPOGRAPHIC)  
SW/4 ALLENTOWN 15' QUADRANGLE

Attachment A

DOCUMENT OFF-LINE

This page has been substituted for one of the following:

- o An oversize page or document (such as a map) which was too large to be scanned into the RIPS system.
- o Microfilm, microform, certain photographs or videotape.
- o Other materials which, for one reason or another, could not be scanned into the RIPS system.

The actual document, page(s) or materials may be reviewed by contacting a Dockets Clerk. Please note the applicable docket or rulemaking number, document type and any other relevant information about the document in order to ensure speedy retrieval by the Dockets Clerk.

Map: figure Three . Topographic Map  
of Transmitter site .

FIGURE FOUR

MAP OF THE PROPOSED 1 MV/M CONTOUR

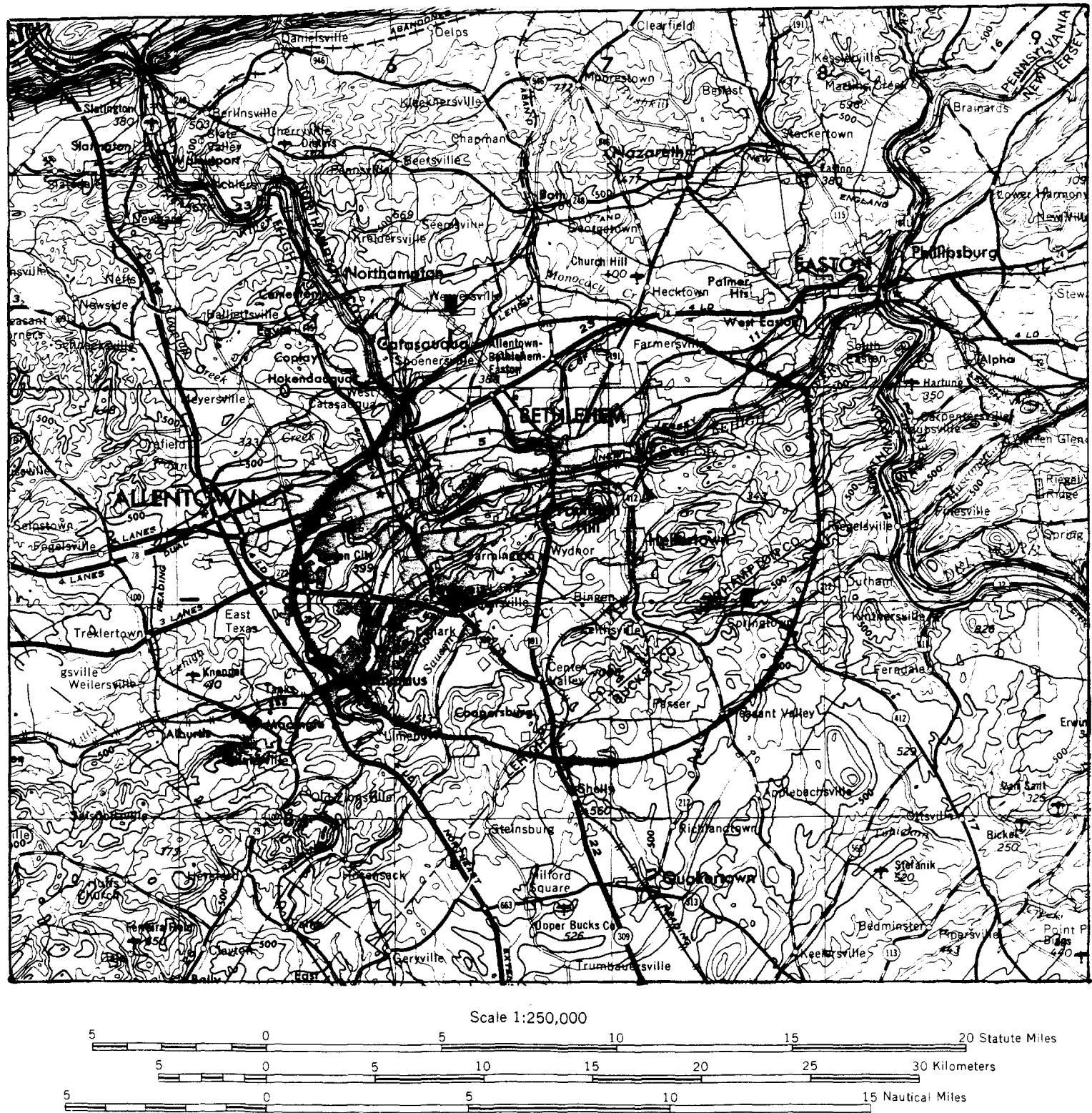


FIGURE FIVE  
ALLOCATIONS STUDY

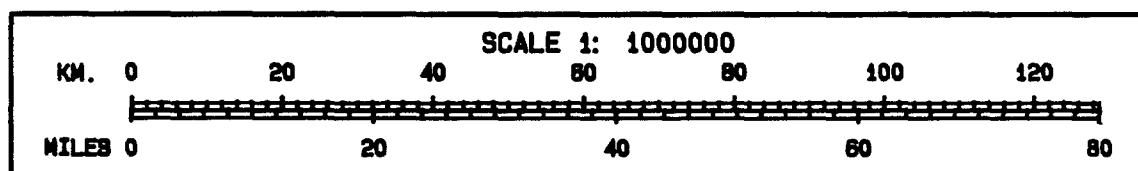
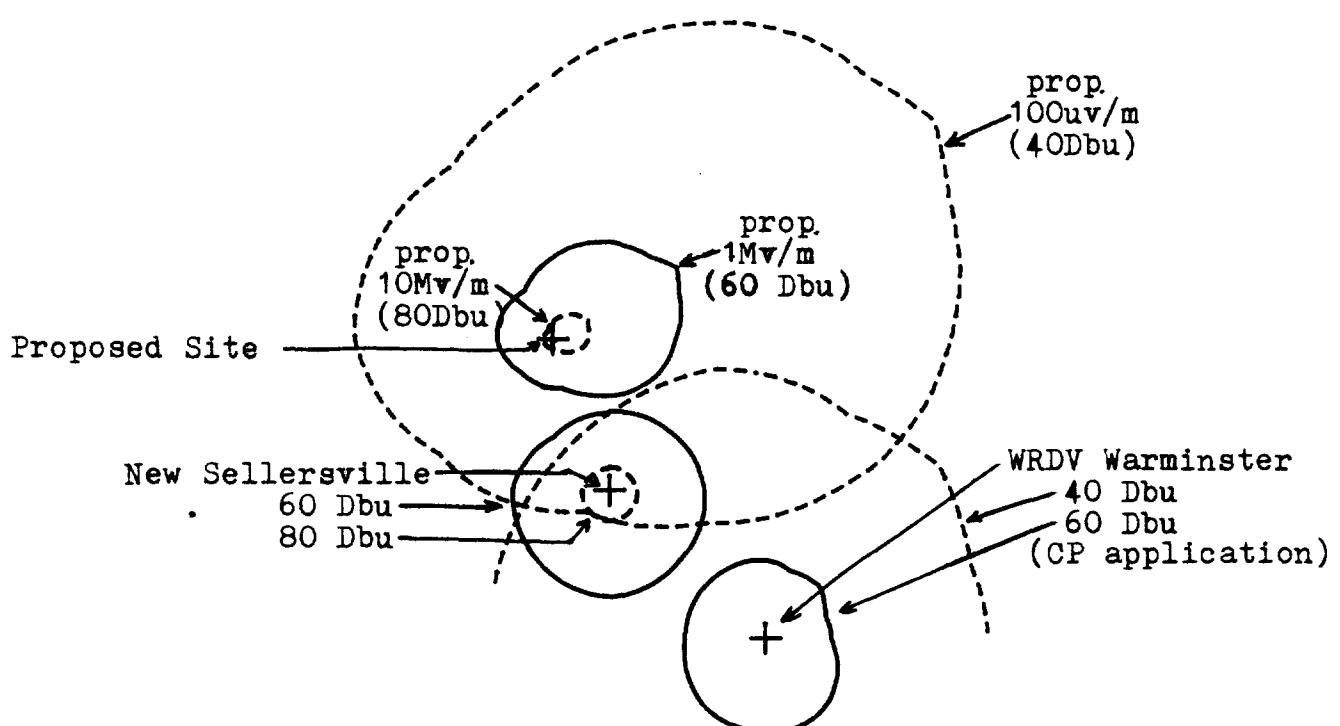
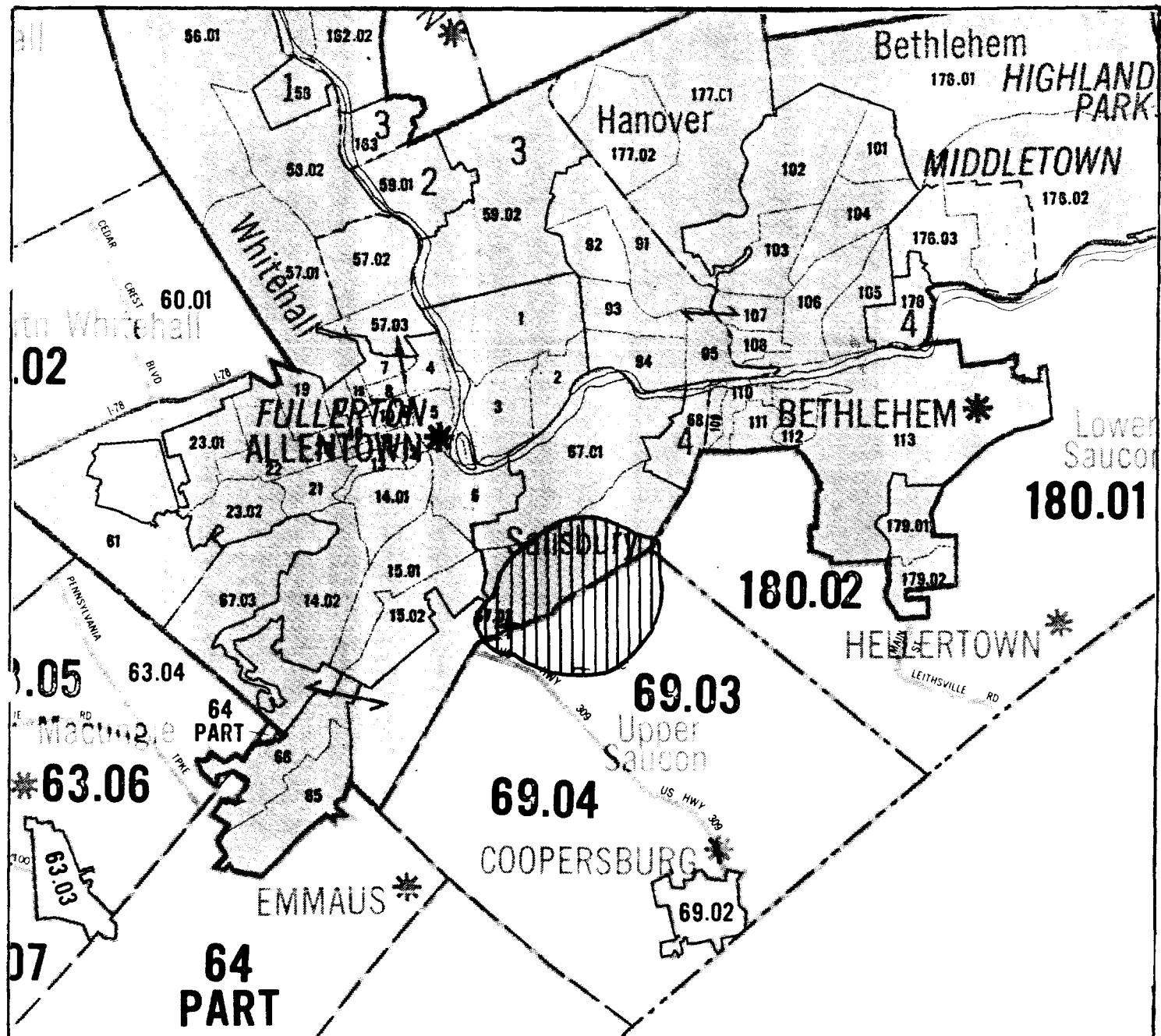


FIGURE SIX

TV CHANNEL SIX INTERFERENCE AREA  
(SHADED)



SCALE

0 2 4 6 8 Kilometers

0 2 4 6 8 Miles

NEW NCE FM  
 ALLENTOWN PA  
 ALLENON  
 TABULATION OF TV/FM CONTOUR CALCULATIONS ON CHANNEL 207

AZIMUTH	ERP, KW.	HAAT (M)	100/10%	80/10%	60/50%	54/10%	40/10%
0	.014	274	.20842	2.3768	10.968	15.042	35.298
45	.088	273	.59763	4.6063	16.615	25.658	53.689
90	.097	251	.62486	4.6351	16.227	25.31	52.893
135	.018	232	.26641	2.5537	10.787	14.81	34.527
180	.004	202	.12277	1.2277	6.4297	9.638	22.817
225	.004	180	.12042	1.2042	6.1395	9.0192	21.48
270	.004	270	.12734	1.2734	7.4318	11.267	26.337
315	.004	278	.12754	1.2754	7.5354	11.429	26.681
10	.023	273.78	.30558	2.8617	12.427	17.5	40.066
20	.036	273.56	.38228	3.336	13.743	20.226	44.37
30	.057	273.33	.48102	3.9897	15.093	23.022	48.863
40	.079	273.11	.56626	4.4534	16.05	25.004	52.494
50	.097	270.56	.62716	4.7321	17.059	26.147	54.568
60	.114	265.67	.76344	4.8879	18.079	27.345	55.556
70	.12	260.78	.69628	5.0224	17.843	27.024	56.1
80	.114	255.89	.67802	4.8964	17.346	26.501	55.107
100	.079	246.78	.56345	4.3377	15.471	23.881	50.255
110	.057	242.56	.47788	3.8779	14.422	21.699	46.521
120	.036	238.34	.37857	3.2354	12.973	18.665	41.725
130	.023	234.11	.30164	2.7909	11.557	15.58	37.057
140	.014	228.67	.23437	2.3092	9.9672	13.991	31.962
150	.009	222	.18696	1.8849	8.5044	12.528	28.894
160	.006	215.33	.15189	1.5189	7.4373	11.171	26.047
170	.004	208.67	.12339	1.2339	6.5315	9.8141	23.2
330	.004	277.91	.12753	1.2753	7.5341	11.427	26.678
340	.006	277.85	.1562	1.562	8.543	12.623	29.152
350	.009	277.8	.1913	1.9473	9.7394	13.82	31.625
AREAS, Sq. Km. :			.36815	23.985	379.76	854.59	4125.7

OVERALL HEIGHT ABOVE AVERAGE TERRAIN = 245 (M)

ALL HEIGHTS IN METERS. ALL CONTOUR DISTANCES IN KILOMETERS.

ALL CONTOURS IN DBU AS DETERMINED BY BIVARIATE INTERPOLATION  
USING VALUES FROM APPROPRIATE FCC F(50,50) AND F(50,10) CURVES.

FM BLANKETING CONTOUR 115 dBU = .09 MILES, .15 KM.  
CALCULATED PURSUANT TO R&R 73.318(a) FOR MAXIMUM ERP.

WRDV  
WARMINSTER PA

TABULATION OF TV/FM CONTOUR CALCULATIONS ON CHANNEL 207

AZIMUTH	ERP, KW.	HAAT (M)	80/10%	60/50%	54/10%	40/10%	40/10%
0	.9	18.76	3.1199	10.423	14.447	35.225	35.225
45	.38	46.659	3.0589	10.047	14.07	32.678	32.678
90	.2	50.96	2.8054	8.7452	12.769	29.562	29.562
135	.6	49.759	3.5443	11.786	15.809	39.883	39.883
180	1	43.361	3.7554	12.429	17.288	43.278	43.278
225	1	41.661	3.6749	12.205	16.785	42.474	42.474
270	1	15.26	3.1797	10.73	14.754	36.698	36.698
315	1	19.46	3.1797	10.73	14.754	36.698	36.698
10	.81	24.96	3.06	10.116	14.14	33.753	33.753
20	.67	31.16	2.9699	9.6524	13.676	31.868	31.868
30	.53	37.36	3.0009	9.7882	13.812	32.05	32.05
40	.42	43.559	3.0333	9.929	13.952	32.291	32.291
50	.34	47.138	3.0079	9.7859	13.809	31.862	31.862
60	.25	48.095	2.8571	9.0168	13.04	30.188	30.188
70	.2	49.049	2.7546	8.493	12.516	29.047	29.047
80	.2	50.006	2.78	8.6193	12.643	29.306	29.306
100	.25	50.692	2.9264	9.3596	13.383	30.883	30.883
110	.34	50.427	3.0959	10.22	14.243	33.254	33.254
120	.42	50.158	3.2102	10.8	14.824	35.703	35.703
130	.53	49.893	3.4255	11.443	15.466	38.425	38.425
140	.67	49.049	3.6217	12.014	16.436	40.906	40.906
150	.81	47.629	3.7454	12.379	17.21	42.599	42.599
160	.9	46.205	3.7841	12.498	17.457	43.262	43.262
170	1	44.785	3.8227	12.617	17.704	43.938	43.938
350	1	19.424	3.1797	10.73	14.754	36.698	36.698
AREAS, Sq. Km. :		34.303	376.48	720.88	4376.2	4376.2	

OVERALL HEIGHT ABOVE AVERAGE TERRAIN = 35.735 (M)

ALL HEIGHTS IN METERS. ALL CONTOUR DISTANCES IN KILOMETERS.

ALL CONTOURS IN DBU AS DETERMINED BY BIVARIATE INTERPOLATION  
USING VALUES FROM APPROPRIATE FCC F(50,50) AND F(50,10) CURVES.

FM BLANKETING CONTOUR 115 dBu = .25 MILES, .39 KM.  
CALCULATED PURSUANT TO R&R 73.318(a) FOR MAXIMUM ERP.

NEW NCE FM

SELLERVILLE, PA

TABULATION OF TV/FM CONTOUR CALCULATIONS ON CHANNEL 205

AZIMUTH	ERP, KW.	HAAT (M)	100/10%	80/10%	60/50%	54/10%	40/10%
0	.1	98	.48506	3.0664	10.491	14.515	33.735
45	.1	108	.50947	3.1926	11.151	15.175	36.004
90	.1	136	.55873	3.6313	12.628	17.732	40.708
135	.1	149	.5712	3.7791	13.142	18.841	42.258
180	.1	178	.60006	4.1326	14.281	21.284	45.589
225	.1	156	.57804	3.8613	13.42	19.433	43.079
270	.1	143	.58541	3.71	12.905	18.329	41.547
315	.1	96.001	.48032	3.0423	10.359	14.383	33.268

AREAS, Sq. Km. : .9338 40.083 480.94 975.35 4965.7

OVERALL HEIGHT ABOVE AVERAGE TERRAIN = 133 (M)

ALL HEIGHTS IN METERS. ALL CONTOUR DISTANCES IN KILOMETERS.

ALL CONTOURS IN DBU AS DETERMINED BY BIVARIATE INTERPOLATION  
USING VALUES FROM APPROPRIATE FCC F(50,50) AND F(50,10) CURVES.

FM BLANKETING CONTOUR 115 dBu = .08 MILES, .12 KM.  
CALCULATED PURSUANT TO R&R 73.318(a) FOR MAXIMUM ERP.

WPVI-TV

COVERAGE CONTOURS

TABULATION OF TV/FM CONTOUR CALCULATIONS ON CHANNEL 6

AZIMUTH	ERP, KW.	HAAT (M)	66.5/50%	66/50%	65.5/50%	65/50%	64.5/50%	64/50%	63.5/50%
0	74.1	327.54	56.697	57.79	58.881	59.972	61.065	62.156	63.249
45	74.1	298.43	54.772	55.857	56.943	58.03	59.114	60.201	61.287
90	74.1	349.7	58.133	59.229	60.325	61.422	62.518	63.614	64.734
135	74.1	375.52	59.821	60.922	62.023	63.123	64.226	65.396	66.579
180	74.1	359.36	58.764	59.861	60.959	62.056	63.155	64.253	65.423
225	74.1	309.5	55.537	56.625	57.713	58.801	59.89	60.978	62.066
270	74.1	281.27	53.528	54.611	55.693	56.774	57.856	58.937	60.019
315	74.1	355.31	58.498	59.596	60.693	61.791	62.887	63.984	65.133
60	74.1	315.53	55.923	57.013	58.102	59.192	60.281	61.371	62.46
65	74.1	321.23	56.29	57.381	58.472	59.562	60.653	61.744	62.834
70	74.1	326.93	56.659	57.75	58.841	59.934	61.025	62.116	63.209
AREAS, Sq. Km. :			10209	10604	11007	11417	11834	12262	12706

OVERALL HEIGHT ABOVE AVERAGE TERRAIN = 332.09 (M)

ALL HEIGHTS IN METERS. ALL CONTOUR DISTANCES IN KILOMETERS.

ALL CONTOURS IN DBU AS DETERMINED BY BIQUADRATIC INTERPOLATION  
USING VALUES FROM APPROPRIATE FCC F(50,50) AND F(50,10) CURVES.

Table P-9. Social Characteristics of Persons: 1980—Con.

[Data are estimates based on a sample; see Introduction. For meaning of symbols, see Introduction. For definitions of terms, see appendixes A and B.]

Census Tracts

Remainder of Lehigh County, Pa.—Con.													
Tract 0063 04	Tract 0063 05	Tract 0063 06	Tract 0063 07	Tract 0064	Tract 0067 01	Tract 0067 02	Tract 0067 03	Tract 0068	Tract 0069 02	Tract 0069 03	Tract 0069 04	Tract 0069 05	Tract 0070
<b>NATIVITY AND PLACE OF BIRTH</b>													
Total persons	2 603	3 994	5 125	1 236	5 013	4 833	2 647	4 779	4 805	2 616	4 166	5 448	2 865
Native	2 546	3 879	4 975	1 222	4 875	4 629	2 514	4 601	4 559	2 604	4 126	5 227	2 799
Born in State of residence	1 671	2 859	3 543	1 111	4 412	4 266	2 261	3 517	4 028	2 181	3 413	4 239	2 293
Born in different State	835	1 008	1 407	111	446	340	253	1 084	494	415	688	953	494
Born abroad, at sea, etc.	40	12	25	—	17	23	—	—	37	8	25	35	12
Foreign born	57	115	150	14	138	204	133	178	246	12	40	221	66
<b>LANGUAGE SPOKEN AT HOME AND ABILITY TO SPEAK ENGLISH</b>													
Persons 5 to 17 years	701	840	1 429	178	1 078	978	606	1 145	725	474	893	1 306	704
Speak a language other than English at home	35	12	61	—	50	39	29	12	27	9	—	26	11
Percent who speak English not well or not at all	—	—	—	—	—	—	13.8	—	—	—	—	—	—
Persons 18 years and over	1 746	2 807	3 362	966	3 614	3 567	1 893	3 449	3 863	1 944	3 056	3 874	1 972
Speak a language other than English at home	107	223	330	90	399	400	185	134	448	35	145	329	152
Percent who speak English not well or not at all	—	—	2.4	—	—	8.3	—	9.7	12.5	—	—	9.7	3.3
<b>SCHOOL ENROLLMENT AND TYPE OF SCHOOL</b>													
Persons 3 years old and over enrolled in school	850	1 065	1 726	253	1 231	1 095	689	1 457	1 095	671	1 463	1 651	783
Nursery school	61	73	94	33	73	41	13	48	30	36	24	76	33
Private	48	66	84	10	58	30	6	41	25	25	24	44	33
Kindergarten	7	67	109	7	110	38	12	75	32	29	78	76	42
Private	—	—	—	—	—	—	—	14	18	—	—	9	5
Elementary (1 to 8 years)	444	533	876	116	645	614	369	674	424	283	529	786	430
Private	106	47	81	7	48	13	48	199	194	22	56	45	40
High school (1 to 4 years)	237	258	473	75	309	311	219	418	285	157	263	459	215
Private	45	17	34	—	10	15	50	58	103	30	20	27	17
College	101	134	174	22	94	91	76	242	324	166	569	254	63
<b>YEARS OF SCHOOL COMPLETED</b>													
Persons 25 years old and over	1 570	2 430	2 981	822	3 045	3 051	1 611	3 025	3 175	1 560	2 330	3 346	1 686
Elementary: 0 to 4 years	6	13	9	7	12	62	—	21	80	11	—	30	15
5 to 7 years	35	63	93	101	187	218	133	76	330	71	126	201	95
8 years	83	228	146	156	410	349	165	121	221	114	261	337	210
High school: 1 to 3 years	80	261	212	189	402	745	342	241	654	210	315	428	206
4 years	499	932	1 096	213	1 233	1 189	619	1 044	1 226	705	822	1 216	676
College: 1 to 3 years	301	315	506	61	347	307	193	518	349	190	343	449	211
4 or more years	566	618	919	95	454	181	159	1 004	315	259	463	685	273
Percent high school graduates	87.0	76.7	84.6	44.9	66.8	55.0	60.3	84.8	59.5	74.0	69.9	70.2	68.8
<b>FERTILITY</b>													
Women 35 to 44 years	238	251	460	57	363	323	166	388	214	182	230	433	202
Children ever born	567	571	1 085	133	896	718	455	853	516	390	530	975	493
Per 1,000 women	2 382	2 275	2 359	2 333	2 468	2 209	2 741	2 198	2 411	2 143	2 304	2 252	2 441
<b>RESIDENCE IN 1975</b>													
Persons 5 years and over	2 497	3 694	4 813	1 157	4 683	4 535	2 487	4 599	4 537	2 384	3 908	5 221	2 671
Same house	1 498	1 931	2 375	669	2 766	3 505	1 922	3 305	2 756	1 523	2 015	3 389	1 701
Different house in United States	999	1 751	2 438	479	1 917	1 050	565	1 272	1 733	861	1 893	1 816	970
Central city of this SMSA	62	525	636	234	450	731	257	387	1 057	101	534	570	218
Remainder of this SMSA	420	509	428	132	978	115	163	379	318	196	637	570	241
Outside this SMSA	517	717	1 374	113	489	204	145	506	358	564	722	676	511
Different SMSA	504	693	1 058	107	394	140	133	449	277	493	684	648	480
Not in an SMSA	13	24	316	6	95	64	12	57	81	71	38	28	11
Abroad	—	12	—	9	—	—	—	22	48	—	—	16	—
<b>JOURNEY TO WORK</b>													
Workers 16 years and over	1 140	1 920	2 444	663	2 525	2 371	1 177	2 142	2 193	1 277	1 936	2 435	1 383
Private vehicle: Drive alone	905	1 492	1 950	530	1 900	1 767	942	1 675	1 440	800	1 424	1 754	1 035
Carpool	125	329	349	91	467	442	195	328	327	292	349	486	273
Public transportation	5	14	32	12	21	64	—	47	71	34	13	87	7
Bus or streetcar	5	7	32	12	21	64	—	41	71	34	13	81	3
Subway, elevated train, or railroad	—	7	—	—	—	—	—	—	—	—	—	6	4
Walked only	56	52	63	4	54	48	5	27	327	99	97	38	18
Other means	6	7	39	13	18	18	15	21	28	9	21	41	9
Worked at home	43	26	11	13	65	32	20	44	—	43	32	29	41
Persons per private vehicle	1.08	1.11	1.09	1.10	1.12	1.12	1.10	1.10	1.11	1.18	1.13	1.13	1.13
Mean travel time to work minutes	15.5	17.7	20.7	18.8	21.2	16.3	20.0	15.7	13.5	17.8	18.0	22.7	22.2
Worked in SMSA of residence	1 024	1 582	2 034	458	2 036	2 220	971	1 876	2 020	680	1 582	1 911	812
Allentown city, Pa.—central business district	51	91	146	42	119	58	8	69	39	24	68	93	35
Remainder of Allentown city, Pa.	487	562	729	106	539	946	366	1 042	216	152	427	801	212
Bethlehem city (pt.), Pa.	27	40	57	16	65	96	58	56	253	58	95	86	12
Remainder of Lehigh County, Pa.	434	732	975	291	1 183	555	368	584	599	357	645	661	457
Bethlehem city, Pa.—central business district	—	—	16	—	—	12	29	11	59	—	37	30	—
Remainder of Bethlehem city (pt.), Pa.	25	119	62	6	81	448	142	50	746	43	239	217	88
Easton city, Pa.—central business district	—	—	—	—	—	—	—	—	—	—	—	—	—
Remainder of Easton city, Pa.	—	—	13	—	—	12	—	16	23	—	—	—	—
Remainder of Northampton County, Pa.	—	—	23	24	7	38	93	—	37	85	46	62	23
Carbon County, Pa.	—	—	15	12	—	11	—	11	—	—	9	—	—
Warren County, N.J.	—	—	15	12	—	11	—	—	—	—	—	—	—
Worked outside SMSA of residence	83	140	243	161	312	24	83	133	70	619	306	344	540
Monroe County, Pa.	—	13	—	—	—	—	16	13	—	—	—	—	—
Hazleton city, Pa.	—	—	—	—	—	—	—	14	—	—	—	—	—
Remainder of Northeast Pennsylvania SMSA	—	—	—	—	—	—	—	13	—	—	—	—	6
Schuylkill County, Pa.	—	—	—	—	—	—	—	—	—	—	—	—	—
Reading, Pa. SMSA	20	63	119	137	89	—	9	15	—	11	—	15	17
Bucks County, Pa.	12	—	11	—	31	24	12	34	50	485	209	229	290
Remainder of Philadelphia, Pa.—N.J. SMSA	51	38	53	24	175	—	—	31	10	123	74	74	217
Hunterdon County, N.J.	—	—	—	16	—	—	—	13	—	—	—	—	—
Morris County, N.J.	—	—	26	44	—	17	46	—	10	—	23	26	10
Worked elsewhere	22	132	93	95	104	118	69	224	109	23	104	157	71
Place of work not reported	—	—	—	—	—	—	—	—	—	—	—	—	—

Table P-1. General Characteristics of Persons: 1980—Con.

[For meaning of symbols, see Introduction. For definitions of terms, see appendixes A and B.]

Census Tracts

Remainder of Northampton County, Pa.—Con.														
	Tract 0125.01	Tract 0175.02	Tract 0176.01	Tract 0176.02	Tract 0176.03	Tract 0177.01	Tract 0177.02	Tract 0178	Tract 0179.01	Tract 0179.02	Tract 0180.01	Tract 0180.02	Tract 0180.03	Tract 0180.04
<b>AGE</b>														
<b>Total persons</b>	<b>2 582</b>	<b>3 946</b>	<b>3 587</b>	<b>4 563</b>	<b>3 944</b>	<b>3 258</b>	<b>2 815</b>	<b>1 879</b>	<b>3 445</b>	<b>2 580</b>	<b>3 171</b>	<b>4 201</b>	<b>4 197</b>	
Under 5 years	139	219	217	312	255	164	118	135	165	136	195	214	267	211
5 to 9 years	141	272	263	353	300	222	172	137	160	147	214	214	267	202
10 to 14 years	174	341	355	380	312	320	305	159	236	171	252	361	384	340
15 to 19 years	183	366	358	415	308	291	364	126	214	219	279	345	345	340
20 to 24 years	191	236	267	274	257	166	175	220	265	188	237	266	311	277
25 to 34 years	334	485	568	781	695	388	259	292	482	350	487	587	621	574
35 to 44 years	280	547	564	592	459	526	460	197	300	293	420	563	547	547
45 to 54 years	362	610	453	629	475	473	506	189	393	358	389	574	581	581
55 to 64 years	398	560	318	498	547	424	312	234	613	467	412	604	485	485
65 to 74 years	269	211	145	243	270	214	100	127	419	181	196	167	190	190
75 years and over	112	99	79	86	66	70	44	60	208	70	89	173	175	175
3 and 4 years	50	97	87	126	129	70	53	53	61	56	78	85	107	107
16 years and over	2 091	3 031	2 674	3 413	3 012	2 491	2 136	1 419	2 847	2 081	2 442	3 292	3 181	3 181
18 years and over	2 021	2 848	2 521	3 233	2 867	2 349	1 957	1 370	2 756	1 979	2 319	3 118	3 178	3 178
21 years and over	1 922	2 688	2 335	3 051	2 729	2 223	1 810	1 221	2 627	1 871	2 175	2 959	2 866	2 866
60 years and over	581	556	372	558	622	462	260	297	933	454	468	701	671	671
62 years and over	491	431	309	469	494	384	198	256	812	370	400	584	585	585
Median	39.0	35.8	31.7	32.4	32.7	36.4	35.5	29.9	41.8	37.2	33.5	36.4	32.4	32.4
<b>Female</b>	<b>1 341</b>	<b>2 018</b>	<b>1 817</b>	<b>2 297</b>	<b>1 971</b>	<b>1 685</b>	<b>1 410</b>	<b>956</b>	<b>1 860</b>	<b>1 323</b>	<b>1 592</b>	<b>2 108</b>	<b>2 142</b>	
Under 5 years	67	113	109	153	127	76	60	76	75	61	104	110	144	144
5 to 9 years	72	123	126	167	116	113	79	62	82	75	117	137	144	144
10 to 14 years	76	155	187	183	153	168	157	72	124	96	125	162	186	186
15 to 19 years	93	194	173	204	147	149	179	61	113	102	127	134	152	152
20 to 24 years	109	124	144	142	121	81	76	113	141	90	120	133	133	133
25 to 34 years	171	261	285	401	363	211	137	146	173	243	292	311	311	311
35 to 44 years	144	285	281	299	229	279	248	107	156	160	203	295	274	274
45 to 54 years	179	316	227	314	241	232	263	96	214	186	197	278	249	249
55 to 64 years	221	267	164	252	290	210	136	122	328	248	211	292	214	214
65 to 74 years	137	108	78	125	144	121	48	67	247	93	98	146	177	177
75 years and over	72	72	43	57	40	45	27	34	136	39	47	108	71	71
3 and 4 years	20	43	36	66	67	32	25	26	27	28	38	39	51	51
16 years and over	1 109	1 579	1 355	1 744	1 545	1 302	1 075	734	1 563	1 066	1 216	1 665	1 634	
18 years and over	1 076	1 485	1 279	1 652	1 479	1 221	988	709	1 512	1 024	1 153	1 600	1 551	
21 years and over	1 018	1 401	1 188	1 567	1 410	1 161	916	666	1 438	971	1 096	1 521	1 471	
60 years and over	321	295	199	294	327	249	128	152	539	241	239	380	359	
62 years and over	271	240	161	256	259	215	103	126	480	196	205	316	324	
Median	40.2	36.1	31.7	32.6	33.6	36.4	36.1	30.8	44.6	38.7	33.4	37.1	32.9	
<b>HOUSEHOLD TYPE AND RELATIONSHIP</b>														
<b>Total households</b>	<b>2 582</b>	<b>3 946</b>	<b>3 587</b>	<b>4 563</b>	<b>3 944</b>	<b>3 258</b>	<b>2 815</b>	<b>1 879</b>	<b>3 445</b>	<b>2 580</b>	<b>3 171</b>	<b>4 201</b>	<b>4 197</b>	
Householder	966	1 295	1 167	1 499	1 339	1 086	847	668	1 374	938	1 064	1 472	1 470	
Family householder	775	1 187	1 004	1 317	1 156	928	788	546	1 022	800	908	1 227	1 187	
Nonfamily householder	191	108	163	182	183	158	59	122	352	138	156	245	243	
Living alone	179	96	129	155	161	134	50	102	324	123	136	215	206	
Spouse	708	1 098	918	1 211	1 048	858	744	449	873	701	821	1 121	1 040	
Other relatives	878	1 524	1 413	1 795	1 505	1 249	1 199	715	1 145	915	1 239	1 500	1 655	
Nonrelatives	27	29	80	56	52	38	25	47	50	26	47	64	52	
Inmate of institution	—	—	—	—	—	—	—	—	—	—	—	—	—	
Other, in group quarters	3	—	9	2	—	27	—	—	3	—	—	—	—	
Persons per household	2.67	3.05	3.07	3.04	2.95	2.98	3.32	2.81	2.51	2.75	2.98	2.82	2.98	
Persons per family	3.05	3.21	3.32	3.28	3.21	3.27	3.47	3.13	2.97	3.02	3.27	3.14	3.31	
Persons 65 years and over	380	310	224	329	336	284	144	187	627	251	285	440	455	
In households	380	310	224	329	336	278	144	187	627	251	285	398	455	
Householder	243	170	125	204	205	156	72	113	407	157	174	243	273	
Nonfamily householder	92	51	44	72	67	45	12	37	166	48	54	84	94	
Living alone	91	50	40	67	64	41	12	32	164	47	50	78	82	
Spouse	98	80	53	73	79	69	41	47	152	63	74	107	104	
Other relatives	39	58	38	43	48	50	31	24	65	31	33	43	50	
Nonrelatives	—	2	8	9	4	3	—	3	3	—	4	5	8	
Inmate of institution	—	—	—	—	—	—	—	—	—	—	—	42	—	
Other, in group quarters	—	—	—	—	—	6	—	—	—	—	—	—	—	
<b>FAMILY TYPE BY PRESENCE OF OWN CHILDREN</b>	<b>775</b>	<b>1 187</b>	<b>1 004</b>	<b>1 317</b>	<b>1 156</b>	<b>928</b>	<b>788</b>	<b>546</b>	<b>1 022</b>	<b>800</b>	<b>908</b>	<b>1 227</b>	<b>1 167</b>	
With own children under 18 years	293	575	544	715	562	459	438	259	359	326	412	556	552	
Number of own children under 18 years	526	1 076	1 032	1 277	1 032	886	830	475	646	581	781	1 031	1 077	
Married-couple families	708	1 098	918	1 211	1 048	858	744	449	873	701	821	1 121	1 040	
With own children under 18 years	267	531	495	660	515	433	416	212	306	278	381	516	505	
Number of own children under 18 years	487	1 007	960	1 198	955	830	797	394	557	505	728	964	977	
Female householder, no husband present	54	67	63	77	78	52	37	67	117	79	63	66	88	
With own children under 18 years	20	36	36	43	32	26	18	38	44	42	26	28	37	
Number of own children under 18 years	32	56	52	68	54	43	28	68	76	67	42	45	45	
<b>MARITAL STATUS</b>	<b>1 002</b>	<b>1 487</b>	<b>1 357</b>	<b>1 724</b>	<b>1 502</b>	<b>1 224</b>	<b>1 106</b>	<b>699</b>	<b>1 305</b>	<b>1 035</b>	<b>1 263</b>	<b>1 660</b>	<b>1 597</b>	
Male, 15 years and over	200	394	348	377	345	278	320	177	284	257	332	392	352	
Now married, except separated	724	1 121	933	1 237	1 067	878	754	464	897	715	843	1 147	1 077	
Separated	14	13	13	21	19	17	5	9	20	5	11	20	24	
Widowed	27	20	25	33	21	24	13	24	55	28	27	47	40	
Divorced	37	29	38	56	50	27	14	25	49	30	50	54	80	
Female, 15 years and over	1 126	1 627	1 395	1 794	1 575	1 328	1 114</							